

## CLAIMS

We claim:

1 1. (Cancelled)

1 2. (Currently amended) ~~The method of claim 1 wherein A method of texture filtering,~~  
2 ~~comprising:~~

3 ~~receiving input information relating to polygon and texture data, where the input~~  
4 ~~information relates to a rate of sampling of the polygon data; and~~

5 ~~morphing a texture reconstruction filter characteristic based upon the input~~  
6 ~~information so that after subsamples are aggregated, an effective filter characteristic~~  
7 ~~matches the texture reconstruction filter characteristic of a texture reconstruction filter used~~  
8 ~~for coarse sampling.~~

1 3. (Currently amended) The method of claim 1 ~~2~~ wherein the input information relates  
2 to a degree of warping per texture coordinate.

1 4. (Currently amended) The method of claim 1 ~~2~~ wherein the effective filter  
2 characteristic matches the characteristic of a bilinear filter.

1 5. (Currently amended) The method of claim 1 ~~2~~ wherein the effective filter  
2 characteristic matches the characteristic of a combination of a bilinear filter and a box filter.

1 6. (Currently amended) The method of claim 1 ~~2~~ wherein the effective filter  
2 characteristic matches the characteristic of a combination of a linear filter between MIP  
3 levels and a combination of a bilinear filter and a box filter.

1 7. (Currently amended) The method of claim 1 ~~2~~ wherein the morphing of the texture  
2 reconstruction filter characteristic is performed in a continuous manner.

1 8. (Currently amended) The method of claim 1 2 wherein the morphing of the texture  
2 reconstruction filter characteristic is determined by a value  $\beta = \min(\delta * (n-1)/n, 1.0)$   
3 wherein  $\delta$  is a degree of warping per texture coordinate and  $n$  is a sampling rate of the  
4 polygon data.

1 9. (Cancelled)

1 10. (Currently amended) ~~The electronically readable medium of claim 9 wherein An~~  
2 ~~electronically-readable medium having embodied thereon a program, the program being~~  
3 ~~executable by a machine to perform a method for texture filtering, the method comprising:~~  
4 ~~receiving input information relating to polygon data and texture data, where the input~~  
5 information relates to a rate of sampling of the polygon data; and

6 ~~morphing a texture reconstruction filter characteristic based upon the input~~  
7 ~~information so that after subsamples are aggregated, an effective filter characteristic~~  
8 ~~matches the texture reconstruction filter characteristic of a texture reconstruction filter used~~  
9 ~~for coarse sampling.~~

1 11. (Currently amended) The electronically-readable medium of claim 9 10 wherein the  
2 input information relates to a degree of warping per texture coordinate.

1 12. (Currently amended) The electronically-readable medium of claim 9 10 wherein  
2 the morphing of the texture reconstruction filter characteristic is performed in a continuous  
3 manner.

1    13. (Original) An apparatus for texture filtering, comprising:  
2        a first module adapted to detect a sampling rate  $n$  of polygon data;  
3        a second module coupled to the first module adapted to select a filtering mode  
4        based upon a sampling rate  $n$  of polygon data and a degree of warping  $\delta$  per texture  
5        coordinate; and  
6            a third module coupled to the second module adapted to compute texel blending  
7        factors based on the filtering mode determined by the second module.

1    14. (Original) The apparatus of claim 13 wherein the second module selects a filtering  
2        mode based upon a value  $\beta = \min(\delta * (n-1)/n, 1.0)$ .

1    15. (Original) The apparatus of claim 13 further comprising a fourth module coupled to  
2        the third module adapted to detect a degree of warping  $\delta$  per texture coordinate.

1    16. (Original) An apparatus for texture filtering comprising:  
2        a filter select module adapted to select a filtering mode based upon a sampling rate  
3         $n$  of polygon data; and  
4            a texel blending module coupled to the filter select module adapted to compute  
5        texel blending factors based on the filtering mode determined by the filter select module.

1    17. (Original) The apparatus of claim 16 wherein the filter select module determines a  
2        filter characteristic of a selected filtering module based upon the sampling rate  $n$  and a  
3        degree of warping  $\delta$  per texture coordinate.

1    18. (Original) The apparatus of claim 16 wherein the filter select module selects the  
2        filtering mode based upon a value  $\beta = \min(\delta * (n-1)/n, 1.0)$ .

1    19. (Currently amended) An apparatus for texture filtering, comprising:  
2        means for receiving input information relating to polygon data and texture data,  
3        where the input information relates to a rate of sampling of the polygon data; and  
4        means for morphing a texture reconstruction filter characteristic based upon the  
5        input information so that after subsamples are aggregated, an effective filter characteristic  
6        matches the texture reconstruction filter characteristic of a texture reconstruction filter used  
7        for coarse sampling.

1    20. (New) The apparatus of claim 19 wherein the input information relates to a degree  
2        of warping per texture coordinate.

1    21. (New) The apparatus of claim 19 wherein the morphing of the texture  
2        reconstruction filter characteristic is performed in a continuous manner.

1    22. (New) A method of texture filtering, comprising:  
2        receiving input information relating to polygon and texture data, where the input  
3        information relates to a degree of warping per texture coordinate; and  
4        morphing a texture reconstruction filter characteristic based upon the input  
5        information so that after subsamples are aggregated, an effective filter characteristic  
6        matches the texture reconstruction filter characteristic of a texture reconstruction filter used  
7        for coarse sampling.